

WHAT IS CLAIMED IS:

1. A scintillator panel comprising a radiation-transparent substrate, a flat resin film formed on said substrate, a reflecting film formed on said flat resin film, and a scintillator formed on said reflecting film.

2. A scintillator panel according to claim 1, wherein at least a part of said scintillator is covered with a transparent organic film.

3. A scintillator panel according to claim 2, wherein said transparent organic film covers over the all surfaces of said scintillator.

4. A scintillator panel according to claim 3, wherein said transparent organic film reaches to the surfaces of said substrate.

5. A radiation image sensor comprising a radiation-transparent substrate, a flat resin film formed on said substrate, a reflecting film formed on said flat resin film, a scintillator formed on said reflecting film, and an imaging device disposed so as to face said scintillator.

6. A radiation image sensor according to claim 5, wherein at least a part of said scintillator is covered with a transparent organic film.

7. A radiation image sensor according to claim 6, wherein said transparent organic film covers over the all

surfaces of said scintillator.

8. A radiation image sensor according to claim 7, wherein said transparent organic film reaches to the surfaces of said substrate.

5 ¹¹9. A method of making a scintillator panel comprising steps of:

forming a flat resin film on a radiation-transparent substrate;

10 forming a reflecting film on said flat resin film; and

forming a scintillator on said reflecting film.

12 ¹⁰10. A method of making a scintillator panel according to claim ¹¹9, further comprising a step of covering at least a part of said scintillator with a transparent organic film.

15 ¹³11. A method of making a scintillator panel according to claim ¹²10, wherein said transparent organic film covers the all surfaces of said scintillator.

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20 12. A method of making a scintillator panel according to claim 11, wherein said transparent film reaches to the surfaces of said substrate.

¹⁶13. A method of making a radiation image sensor comprising steps of:

25 forming a flat resin film on a radiation-transparent substrate;

forming a reflecting film on said flat resin film;

forming a scintillator on said reflecting film; and
 disposing an imaging device opposite said
 scintillator.

5 ¹⁷14. A method of making a radiation image sensor
 according to claim ¹⁶13, further comprising a step of covering
 at least a part of said scintillator with a transparent
 organic film.

10 ¹⁸15. A method of making a radiation image sensor
 according to claim ¹⁷14, wherein said transparent organic film
 is covering the all surfaces of said scintillator.

¹⁶16. A method of making a radiation image sensor
 according to claim 15, wherein said transparent film reaches
 to the surfaces of said substrate.

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